

Case Study 3: Convertible Bond Portfolio Evaluation

Client Type	Large Pension Fund
Asset Class	Convertible Bonds
Portfolio Scenario	Client has a passive U.S. convertible bond portfolio in which an index approach has been taken to gaining exposure to the asset class.
Client Request	Client seeks the advice of MRA on the quality of portfolio construction, risk exposure, and recommendations on how to better systematize the approach.
MRA Deliverables	<ul style="list-style-type: none">▪ Take in portfolio positions and build customized spreadsheet to assess risk exposures. Calculate portfolio sensitivities including delta, gamma, rho, credit DV01, and vega.▪ Prepare aggregated portfolio exposures and compute offsetting “index” hedges to neutralize risks.▪ Parse positions based on sectors. Calculate the implicit over or under hedge in each sector relative to the SPX. Do this for delta and vega exposure.▪ Calculate other hidden exposures including dividend and borrow sensitivities.▪ Perform analysis of impact to hedged convert positions to take-overs given short stock hedge. This included case by case analysis of specific take-out language in the indenture of each bond. Find instances in which portfolio was especially vulnerable to a take-out and provide recommendations on how to change delta hedge (in some cases with option overlay).▪ Suggested other screening factors in determining portfolio construction.▪ Provide conclusions to client and make recommendations on trades needed to create greater consistency with index.
Result	Client rebalanced the equity hedge to neutralize sector exposures.